Draft Site-Specific Community Air Monitoring Plan

Niagara Falls Boulevard Radiological Site
Niagara Falls, Niagara County, New York

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DC No.: RST3-02-D-0274
TDD No.: TO-0006-0225
EPA Contract No.: EP-S2-14-01

May 2016

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1.0 INTRODUCTION

This Site-Specific Community Air Monitoring Plan (CAMP) has been prepared for the Removal Action to be implemented at the Niagara Falls Radiological (the Site) beginning May 31, 2016. The Site is located in a mixed commercial and residential area of Niagara Falls, New York. The Site consists of two parcels, namely 9524 and 9540 Niagara Falls Boulevard and it encompasses approximately 2.53 acres. Currently, the 9524 Niagara Falls Boulevard property contains a bowling alley and an asphalt parking lot; the 9540 Niagara Falls Boulevard property is occupied by a hardware store, Greater Niagara Building Center, Inc. (GNBC) and an asphalt parking lot. The properties are bordered to the north by a wooded area; to the east by a church; to the south by Niagara Falls Boulevard, beyond which is a residential area; and to the west by a hotel and residential area.

In 1978, the U.S. Department of Energy (DOE) conducted an aerial radiological survey of the Niagara Falls region and identified more than 15 properties having elevated levels of radiation above background levels. It is believed that, in the early 1960s, slag from the Union Carbide facility located on 47th Street in Niagara Falls was used as fill on the properties prior to paving. The Union Carbide facility processed ore containing naturally-occurring high levels of uranium and thorium to extract niobium. The slag contained sufficient quantities of uranium and thorium to be classified as a licensable radioactive source material. Union Carbide subsequently obtained a license from the Atomic Energy Commission (AEC), now the Nuclear Regulatory Commission (NRC), and the State of New York; however, the slag had already been used as fill throughout the Niagara Falls region prior to licensing. Based on the original survey and subsequent investigations, it is believed that the radioactive Union Carbide slag was deposited on the Site.

In September/October 2006 and May 2007, the New York State Department of Environmental Conservation (NYSDEC) conducted radiological surveys of the interior and exterior of both properties on several occasions using gamma detectors, Exploranium-135 and Ludlum Model 2221 Ratemeter/Scaler (Ludlum-2221). With the exception of an office area and storage space at 9540 Niagara Falls Boulevard that was constructed after the original building directly on top of the asphalt parking lot, interior radiation levels obtained with Exploranium-135 were relatively low. The highest reading in the newer area was 115 microroentgen per hour (μR/hr); elsewhere throughout the building, radiation levels generally ranged between 10 and 20 μR/hr. Exterior readings taken at waist height generally ranged between 10 and 350 μR/hr, while the maximum reading of 600 μR/hr was recorded at contact (i.e., at the ground surface). At a fenced area behind the building located at 9540 Niagara Falls Boulevard, waist-high readings ranged between 200 and 450 μR/hr, and at-contact readings ranged between 450 and 750 μR/hr. Elevated readings were also observed on the swath of grass between the 9524 Niagara Falls Boulevard property and the adjacent property to the west that contains a hotel, and in the marshy area beyond the parking lot behind the buildings. Two biased samples of slag were collected from locations that exhibited elevated static Ludlum-2221 readings: one slag sample collected from an area of loose blacktop indicated a reading of 515,905 counts per minute (cpm) and the second slag sample collected in the marshy area indicated a reading of 728,235 cpm.

During a reconnaissance performed by the New York State Department of Health (NYSDOH) and NYSDEC on July 9, 2013, screening activities with a hand-held pressurized ion chamber (PIC) unit around an area of broken asphalt indicated gamma radiation levels at 200 μR/hr and 500 μR/hr from a soil pile containing slag at the Site. Readings over 600,000 cpm were recorded with a sodium iodide scintillator from the soil and slag pile.

On September 10, 2013, the U.S. Environmental Protection Agency (EPA) contractor, Weston Solutions Inc., Site Assessment Team (SAT), conducted a gamma radiation screening of the 9524 Niagara Falls Boulevard property using Ludlum-2221. On December 4 and 5, 2013, further radiological survey information was obtained from the 9524 and 9540 Niagara Falls Boulevard properties, as well as the church property located further east of the two site parcels. The highest gamma radiation screening results were recorded from the exposed soil area in the rear northern portion of the 9540 Niagara Falls Boulevard property. From December 5 through 7, 2013, SAT documented the areas of observed contamination at the Site. The areas of observed contamination were delineated by measuring the gamma radiation exposure rates and determining where the gamma radiation exposure rate around the source equals or exceeds two times (2x) the site-specific background gamma radiation exposure rates. The areas of observed contamination are defined by site-attributable gamma radiation exposure rates, as measured by a survey instrument held 1-meter above the ground surface, which equal or exceed 2x the site-specific background gamma radiation exposure rate. An area of the Site, approximately 168,832 square feet (sq. ft.), indicated gamma radiation levels exceeding 2x the background measurement of 8,391 cpm. PIC data were also collected at several points to confirm the boundary. On December 11, 2013, SAT collected a total of 16 soil samples, including one duplicate, and three slag samples, from fifteen boreholes advanced throughout the Site and at the First Assembly Church property, located at 9750 Niagara Falls Boulevard, directly adjacent to the east and northeast portions of the Site, using hollow-stem auger drilling methods. The two soil samples collected on the First Assembly Church property were to document background conditions. At each sample location, soil samples were collected directly beneath slag; at locations where slag was not present, the soil sample was collected at the equivalent depth interval. The soil samples were analyzed for target analyte list (TAL) metals [Inductively Coupled Plasma-Atomic Emission Spectrometry (ICP-AES)] via EPA SW846 Method 6010C; isotopic thorium and isotopic uranium, via DOE alpha spectroscopy Health and Safety Laboratory (HASL)-300 Method A-01-R; radium-226, radium-228, and radioisotopes, via EPA gamma spectroscopy HASL-300 Method GA-01-R. The slag samples were analyzed for isotopic thorium and isotopic uranium, via DOE alpha spectroscopy HASL-300 Method A-01-R; radium-226, radium-228, and radioisotopes, via EPA gamma spectroscopy HASL-300 Method GA-01-R. Analytical results indicated concentrations of radionuclides found in the slag and soil samples to be significantly higher than at background condition.

On April 28, 2014, SAT personnel collected radon and thoron concentration measurements from locations on and in the vicinity of the Site. At the selected locations in background areas, above the source material, and off the source area, radon and thoron concentration measurements in picocuries per liter (pCi/L) were collected with RAD7 radon/thoron detectors. The radon and thoron measurements were collected at heights of one meter above the ground surface. The measurements included uncertainty values, which were taken into account to calculate adjusted concentrations for evaluation of observed release in the air migration pathway. There were no radon or thoron concentration measurements that exceeded the site-specific background concentration, nor were there any adjusted concentrations that equaled or exceeded a value two standard deviations above the mean site-specific background concentration for these radionuclides in this sample type (i.e., there is no evidence of an observed release to air from site sources).

On July 21 through 23, 2015, as part of a Removal Assessment of the Site, EPA and Weston Solutions, Inc., Removal Support Team 3 (RST 3) conducted radiological survey of on-site properties, including 9524 Niagara Falls Boulevard (Property N001), 9540 Niagara Falls Boulevard (Property N002), and an off-site background location at 9750 Niagara Falls Boulevard (Property N003). The presence/absence of radon/thoron gases were determined using RAD7 radon/thoron detectors and gamma radiation levels was determined using Fluke Pressurized Ionization Chamber (FPIC) Model 451P, Ludlum Model 2241 (Ludlum-2241), and Reuter-Stokes RSS-131ER High Pressure Ion Chamber (HPIC) gamma survey meters. Specific isotopes were identified using a Berkeley Nucleonics Corporation (BNC) SAM 940™ (SAM-940) portable radioisotope identification system. Radiological survey measurements collected from suspected source areas at Properties N001 and N002 were compared with measurements obtained from a pre-determined background location at property N003. Radiological survey results indicated elevated levels of gamma radiation at on-site locations and within the on-site building at property N002. Thorium-232 (Th-232) was identified at locations with elevated gamma measurements that were significantly above background.

On August 10 through 13, 2015, EPA and RST 3 conducted soil sampling and radiological survey of exterior on-site locations to verify the presence of residual contamination, potential releases of radiation-containing materials in soil and fill material associated with slag from the former Union Carbide facility, determine radiation source areas, and delineate the extent of on-site radiological contamination. The Soil samples were analyzed for TAL metals ICP-AES, in accordance with EPA SW846 Method 6010C; total mercury, in accordance with EPA SW846 Method 7471B; isotopic thorium (thorium-228, thorium-230 and thorium-232) and isotopic uranium (uraniu-233/234, uranium-235/236 and uranium-238), in accordance with DOE alpha spectroscopy HASL-300 Method A-01-R; Radium-226, Radium-226 (21-day ingrowth), Radium-228, and other gamma emitting radioisotopes, in accordance with EPA gamma spectroscopy HASL-300 Method GA-01-R. Aqueous rinsate samples collected to demonstrate proper decontamination of non-dedicated sampling equipment were analyzed for TAL metals, in accordance with EPA SW846 Method 6010C; total mercury, in accordance with EPA SW846 Method 7471B; Isotopic thorium and isotopic uranium, in accordance with DOE alpha spectroscopy HASL-300 Method A-01-R; other gamma emitting radioisotopes, in accordance with EPA gamma spectroscopy Method GA-01-R; Radium-226, in accordance with EPA SW-846 Method 9315, and Radium-228 Gas Flow Proportional Counter (GFPC), in accordance with EPA SW-846 Method 9320. Analytical results indicated elevated levels of radium-226 in site soils. Analytical results indicated exceedance of manganese, magnesium, iron, and thallium above EPA Removal Management Levels (RMLs) in one or more soil samples.

On August 10 through 13, 2015, an RST 3-procurred National Radon Safety Board (NRSB)-certified radon professional company conducted indoor air sampling of on-site buildings at properties N001 and N002 to ascertain the concentration of radon gas being emitted within living spaces of the buildings. Passive activated charcoal canisters were used to conduct short-term radon sampling tests that lasted a minimum of approximately 72 hours. Canister placement was conducted in accordance with the guidelines presented in the American National Standards Institute (ANSI)/American Association of Radon Scientists and Technologists (AARST) *Protocol for Conducting Radon and Radon Decay Product Measurements in Multifamily Buildings* (MAMF 2012). Radon analytical results did not indicate exceedance of radon above the Site-Specific Action level of 4.0 pCi/L.

On August 13, 2015, EPA also collected swipe samples from entryways and locations within Property N002. The swipes were analyzed by EPA using a Ludlum 3030. For selected counting durations, the Minimum Detectable Activity (MDA) for 100 square centimeters was below 100 disintegrations per minute (dpm) for alpha count and 1,000 dpm for beta count, respectively outlined in **New York City** Department of Health and Mental Hygiene (NYC DOHMH) Article 175 of the NYC Health Code, "Radiation Control", §175.03 - Release of Materials or Facilities."

1.1 Community Air Monitoring Program Objectives

The primary contaminants of concern in on-site soils are radioactive materials from the decay process of uranium and thorium. Specifically, radium-226 and radium-228 have been identified at concentrations exceeding the EPA's Site-Specific Preliminary Remediation Goals (PRGs) of 4.06 and 26.3 pCi/g, respectively.

Uranium (half-life of 4.5 billion years) is a naturally occurring radioactive isotope, decaying primarily by alpha emission with accompanying gamma. Uranium produces several radioactive isotopes including radium-226 (Ra-226) and radon-222 (Rn-222), which have a half-life of 1,602 years and 3.8 days, respectively. Rn-222 is a radioactive isotope which naturally forms as a gas, producing several radioactive radon decay products, including polonium-218, lead-214, bismuth-214, and polonium-214.

Thorium (half-life of 14 billion years) is a naturally occurring radioactive isotope, decaying primarily by alpha emissions with accompanying gamma. Thorium produces several radioactive isotopes, including gamma emitting actinium-228 (Ac-228), lead-212 (Pb-212), bismuth-212 (Bi-212), radium-224 (Ra-224), and thoron-220 gas (Rn-220). Ra-224 and Rn-220 have a half-life of 3.6 days and 55 seconds, respectively.

The selected remedy for the Removal Action is the excavation and off-site disposal of contaminated soils. Work zone activities at the Site will include, but are not limited to, breaking/removal of concrete foundation slabs and demolition of sections of the on-site building at 9540 Niagara Falls Boulevard, soil excavation and handling, clearing/grubbing, building construction, as well as activities involving the loading and transporting of soil for off-site disposal. Since Site activities could generate dust which may potentially contain elevated concentrations of radioactive particulates, the following objectives have been set for the Site air monitoring program:

- Establish Site-Specific Action Levels for dust/Site contaminants;
- Continuously monitor dust particulate concentrations in air to ensure that off-site migration of contaminants remains below the Site-Specific Action Levels;
- Collect confirmation dust particulate samples for radioactivity analysis to ensure that unhealthy levels of these contaminants are not exceeded in the ambient air; and
- Establish corrective actions to be taken in the event that temporary exceedances of Site-Specific Action Levels are experienced.

This Site-Specific CAMP outlines the air quality monitoring and sampling procedures to be followed to protect on-site personnel and the surrounding community from potential airborne contaminant releases during the implementation of the Removal Action.

2.0 PERIMETER AND COMMUNITY AIR MONITORING

2.1 Air Monitoring Procedures

Air monitoring activities will be conducted in accordance with the procedures outlined within the EPA guidance document entitled, "Superfund Program Representative Sampling Guidance, Volume 2: Air (Short-Term Monitoring), Interim Final. 1995. EPA 540/R-95/140. (OSWER Directive 9360.4-09, PB 96-963206)." Appropriate activities as outlined within this document include the monitoring necessary to ensure appropriate Health & Safety levels for protection of on-site personnel and to ensure that the surrounding community is not exposed to site-related constituents at concentrations above the Site-Specific Action Levels.

Real-time particulate air monitors (*e.g.*, DustTraks or equivalent) equipped with PM_{10} (particulate matter smaller than 10 microns in diameter) detectors will be used to monitor dust levels throughout the duration of the Removal Action. The monitors will be operated each workday and will measure PM_{10} dust concentrations in real time. The monitors are calibrated by the equipment manufacturer prior to being used at the Site. When the monitors are turned on daily, the instrument is self-calibrating. Once turned on, the monitors record dust concentrations on a 15-minute time-weighted average (TWA). Meteorological data consisting of wind speed, wind direction, temperature, and barometric pressure will be recorded each day to position the monitoring equipment in appropriate upwind and downwind locations. All air monitoring data with time, current activity and the locations of monitoring equipment will be recorded in the on-site files and will be available for review. Meteorological data will be obtained from Weather Underground (http://www.wunderground.com/) and recorded daily in the Site logbook.

Air monitoring will consist of continuous real-time air quality monitoring and data collection. Monitoring locations will be upwind, at areas of intrusive site activity, and downwind. The monitoring stations will be linked via a Netronics system (a wireless network-based communications system) which will provide instantaneous real-time air quality readings through a computer server. The air monitoring data generated will help to determine if dust suppression activities are effective at maintaining dust levels below the Site-Specific Action Levels. Although air monitoring data from each monitoring station is automatically being stored real-time in a computer server, the air monitoring data will be downloaded from each DustTrak unit to a computer or electronic data storage device at the end of each workday.

Table 2-1: Air Monitoring Specifications

Direct Reading Instrumentation	Monitoring Locations	Monitored Parameters
DustTraks	• Perimeter monitoring • Workspace monitoring	Total PM_{10} Particulates

2.2 Basis for Establishing the Air Monitoring Action Levels

The community air monitoring program at the Site consists of a combination of perimeter and community monitoring for particulates (dust). The Site-Specific Action Level for PM_{10}

particulates has been derived based on the EPA National Ambient Air Quality Standards (NAAQS), and a series of calculations performed using the average concentrations of each contaminant in soil (Ra-226 and Ra-228). The NAAQS Action Level for total PM_{10} is 150 micrograms per cubic meter ($\mu g/m^3$). However, based on the most conservative contaminant of concern (*i.e.* Ra-226), the Site-Specific Action Level for PM_{10} particulates has been established at 0.12 milligrams per cubic meter (mg/m^3) (120 $\mu g/m^3$). This was calculated using the following equation, which calculates a corresponding PM_{10} Action Level for contaminated dust based on the Risk-Based Action Levels for each contaminant of concern (Ra-226 and Ra-228) and the average contaminant concentrations found on Site, then dividing the result by a safety factor as follows:

$$PM_{10}\text{ Action Level }(mg/m^3) = \frac{(10^6\ mg/kg)(\text{Risk-Based Action Level } mg/m^3)}{(\text{Concentration } mg/kg)(\text{Safety Factor})}$$

Where:

10^6 mg/kg = conversion factor

Risk-Based Action Level for Lead = 0.00015 mg/m^3

Concentration = average concentration detected at the Site (624.1 mg/kg)

Safety Factor = degree of confidence of concentration, 1 being very confident and 10 being not confident. A safety factor of 2 was used as there is a high degree of confidence in the analytical results of the soil samples. The degree of confidence in the soil analytical results warrants a safety factor of 1 but to be conservative a safety factor of 2 was utilized.

The following are the calculations for all site-specific contaminants of concern:

Ra-226

Total Data Points: 384

Average Concentration: 29.7 mg/kg

$$PM_{10}\text{ Action Level }(mg/m^3) = \frac{(10^6\ mg/kg)(0.0005\ mg/m^3)}{(29.7\ mg/kg)(2)}$$

$$= 8.42\ mg/m^3\ (8{,}420\ \mu g/m^3)$$

Ra-228

Total Data Points: 119

Average Concentration: 624.1 mg/kg

$$PM_{10}\text{ Action Level }(mg/m^3) = \frac{(10^6\ mg/kg)(0.00015\ mg/m^3)}{(624.1\ mg/kg)(2)}$$

$$= 0.12\ mg/m^3\ (120\ \mu g/m^3)$$

The calculated Action Level assumes that the Site contaminants (Ra-226 and Ra-228) will be present in airborne dust at the average concentration detected in on-site soils (624.1 mg/kg). A level of 0.12 mg/m^3 is an acceptable Site-Specific particulate Action Level based on the NAAQS; however, as a conservative approach, a 0.100 mg/m^3 (100 $\mu g/m^3$) 15 minute average over background level, with a maximum of 0.120 mg/m^3 (120 $\mu g/m^3$) 15 minute average over background will be adopted as the Site-Specific particulate Action Level. See Table 2-2 for the air monitoring Action Levels for particulates at the Site.

Table 2-2: Community Air Monitoring Action Levels for Particulates (Direct Reading Instrumentation)

Parameter	Monitoring Locations and Interval	Action Levels (Above Upwind)	Response Activity
Dust (PM_{10})	Perimeter and community monitoring locations with dust readings every 60 seconds, calculate 15-minute average during Removal Action activities.	< 100 $\mu g/ m^3$	• Continue monitoring.
		≥ 100 $\mu g/m^3$	• Continue monitoring. • Begin dust suppression measures. • Notify field crew that early warning alert level has been reached.
		≥ 120 $\mu g/m^3$	• Cease activities; re-evaluate dust suppression measures. • Analyze collected air samples for the contaminants of concern. • If during transport and disposal of hazardous waste, commence community air monitoring.

2.3 Non-working Hours

No release of contaminants above background levels is anticipated during non-working hours, therefore, no monitoring will be conducted during that time period.

2.4 Equipment Maintenance and Calibration

All air monitoring equipment will be maintained in accordance with applicable manufacturer recommendations. All pertinent data will be logged in a health and safety logbook (or equivalent) and maintained on site for the duration of site activities. All direct-reading instrumentation will be calibrated in accordance with the manufacturer's instructions.

2.5 Engineering Controls

Dust suppression measures, utilizing a water mist, will be the primary engineering control used during all site intrusive activities. It will be implemented as necessary to prevent the generation of dust during breaking of concrete foundation slabs, soil excavation and soil handling operations. Water will be used to wet the surfaces of all contaminated soil stockpiles, loading areas, access roads, and areas being excavated.

3.0 AIR SAMPLING

3.1 Air Sampling Procedures

In addition to real-time dust monitoring, air sampling will be conducted daily at each air monitoring station. RADēCO air samplers calibrated by the manufacture and equipped with replaceable filter media will be used to collect ambient air samples at a flow rate determined by the EPA Health Physicist in cubic feet per minute (cfm) from each monitoring station. Prior to and at the end of each air sampling event, a portable calibrator will be utilized to recalibrate each RADēCO unit to the desired start flow rate and to obtain the end flow rate in order to determine the average flow rate for the selected sampling period. Each RADēCO unit will be mounted on a tripod stand, powered with an electric generator, and positioned in an opposing wind direction.

Air samples will be collected from perimeter and community air monitoring locations upon initiation of intrusive activities (excavation) and periodically as needed depending on changes in Site conditions, expected elevated contaminant concentrations in soils being excavated, and if analytical results of previous air samples indicate there is a need for further sampling. The samples will be analyzed on-site by EPA's Health Physicist using a Ludlum (Model 3030) Alpha Beta counter.

Table 3-1: EPA and NIOSH Sampling Procedures

Analyte	Sampling Method	Sampling Media	Recommended Flow Rate (Liters per Minute)*	Total Volume	Site-Specific Action Level
Ra-226	EPA Method TO-10A	Air Filter	5 cfm	2,400 cf	0.5 μg/m³
Ra-228	NIOSH Method 7300	Air Filter	5 cfm	2,400 cf	0.15 μg/m³

Notes:
* Actual flow rates will be determined in the field based on prevailing Site conditions. Humidity conditions and precipitation events may require air sampling activities to be cancelled for the day.

3.2 Basis for Establishing Air Sampling Action Levels

The Site-Specific Risk-Based Action Levels for each contaminant of concern are as follows:

- Ra-226 - 0.5 μg/m³;
- Ra-228 - 0.15 μg/m³

These Action Levels were developed by EPA Health Physicist and Risk Assessors and will be adopted as the Site-Specific Risk-Based Action Levels. For effective implementation of engineering controls, all air sampling results will be compared with the Site-Specific Risk-Based Action Levels. Most analytical results of air samples collected will be available on site for review the day after sample collection.

If analytical results of air samples indicate that the Site-Specific Risk-Based Action Levels were exceeded, the cause of the exceedance will be investigated and appropriate corrective actions will be implemented immediately. An evaluation of additional engineering control options, additional off-site air monitoring/sampling and a reduction in daily work hours will also be considered. See Table 3-2 for the Site-Specific Risk-Based Action Levels established for the Removal Action.

Table 3-2: Community Air Sampling Action Levels

Parameter	Sampling Interval and Locations	Action Levels (Above Background)	Response Activity
Contaminants of Concern	Upon initiating intrusive activities and periodically; at perimeter and community monitoring locations	$<0.15\ \mu g/m^3$ – Ra-226 $<0.15\ \mu g/m^3$ – Ra-228	• Continue monitoring PM_{10}.
		$>0.15\ \mu g/m^3$ – Ra-226 $>0.15\ \mu g/m^3$ – Ra-228	• Cease activities; investigate cause. • Re-evaluate dust suppression measures. • Consider additional off-site air monitoring/sampling. • Evaluate site conditions for other engineering control options.

3.3 Non-working Hours

No release of contaminants above background levels is anticipated during non-working hours, therefore, no air sampling will be conducted during that time period.

4.0 REPORTING OF AIR MONITORING AND SAMPLING RESULTS

4.1 Community Notification Procedures

The specific community notification procedures will be at the discretion of the EPA On-Scene Coordinator (OSC). The exact notification procedures will be developed based on the most feasible means of getting information to the surrounding community in an effective, useful, and timely manner.

4.2 On-Site Reporting Procedures

The Site Health and Safety Representative will maintain a sample log and report airborne levels on a daily basis to the EPA OSC. Elevated results (above Action Levels) will be reported immediately to the EPA OSC so that appropriate engineering controls can be implemented to reduce airborne levels.

4.3 Reporting Procedures for Site Employees

Where personal sampling for on-site workers is performed, the Contractor will be responsible for informing employees and subcontractors of their monitoring results to comply with Occupational Safety and Health Administration (OSHA) regulations and good occupational health practices. Within five working days after the receipt of monitoring results, the Contractor will notify each employee of the results representing that employee's level of exposure.

Whenever the results indicate that employee exposure exceeds the OSHA Permissible Exposure Limits (PELs)/EPA Risk-Based Action Level, notification shall be provided to the affected employee stating that the OSHA PEL/EPA Risk-Based Action Level was exceeded and providing a description of the corrective action taken to reduce exposures to a level below the OSHA PELs/EPA Risk-Based Action Level.

4.4 Reporting Procedures for the Analytical Laboratory

Chain-of-custody (COC) procedures will be followed during sample handling and submission to EPA Health Physicist for analysis. Areas sampled, tasks performed, duration, volumes, and laboratory results will be provided in a report for the duration of the Removal Action. Sampling and analysis will be performed in accordance with the appropriate EPA and NIOSH methods under the direction of the EPA OSC.

4.5 Data Review and Interpretation

The general public will be able to review the captured data for the Site once the air sampling data has been validated and finalized, and based upon the EPA OSC's authorization for release of the information. Monitoring records will be maintained on site.

EPA and NIOSH Analytical Methods